Table 4:	Risk-Adjusted Coverage Ratios

This table shows, for 11 asset allocations with different proportions of stocks (S) and bonds ($100 - S$), over 121 rolling 30-year retirement periods beginning with 1872–1901 and ending with 1992–2021 for the United States, and over 91 rolling 30-year retirement periods beginning with 1900–1929 and ending with 1990–2019 for the average country in the sample (Avg.) and for the world market, summary statistics for the distributions of coverage ratios. The analysis is based on a $1,000 retirement portfolio, a 4% initial withdrawal rate, 30 annual withdrawals adjusted by inflation, and annual rebalancing. For each distribution, the statistics include the mean (C^M), the standard deviation (C^{SD}), and the risk-adjusted coverage ratio (RAC) as defined in expression (2). The figure highlighted indicates the optimal strategy. The data is described in Table A1 in the appendix.

$S \rightarrow$	100%	90%	80%	70%	60%	50%	40%	30%	20%	10%	0%
U.S.											
C^M	3.76	3.43	3.11	2.81	2.53	2.27	2.03	1.82	1.63	1.46	1.32
C^{SD}	2.05	1.72	1.49	1.32	1.20	1.10	1.03	0.96	0.89	0.82	0.75
RAC	1.83	1.99	2.09	2.13	2.11	2.05	1.98	1.90	1.83	1.78	1.76
Avg.											
C^M	2.98	2.79	2.60	2.42	2.23	2.04	1.86	1.69	1.53	1.39	1.25
C^{SD}	2.91	2.64	2.40	2.19	1.99	1.80	1.63	1.46	1.31	1.17	1.04
RAC	1.15	1.18	1.21	1.22	1.22	1.22	1.22	1.23	1.23	1.25	1.26
World											
C^M	2.74	2.55	2.37	2.20	2.04	1.90	1.78	1.66	1.54	1.44	1.34
C^{SD}	1.51	1.36	1.27	1.24	1.23	1.22	1.22	1.20	1.17	1.14	1.09
RAC	1.82	1.88	1.86	1.78	1.67	1.56	1.46	1.38	1.31	1.26	1.22